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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/693,086	10/24/2003	Abimael Cordova	MAT4690-1	8475

7590 03/10/2005  
Robert W. Mulcahy  
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EXAMINER	
SASTRI, SATYA B	
ART UNIT	PAPER NUMBER
1713	

DATE MAILED: 03/10/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

**Office Action Summary**

Application No.

10/693,086

Applicant(s)

CORDOVA, ABIMAEEL

Examiner

Satya B Sastri

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 24 October 2003.
- 2a) ☐ This action is FINAL. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1-20 is/are pending in the application.
- 4a) Of the above claim(s) 9-20 is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-5, 7 and 8 is/are rejected.
- 7) ☒ Claim(s) 1, 2, 6 is/are objected to.
- 8) ☒ Claim(s) 1-20 are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☒ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)  
Paper No(s)/Mail Date 10/24/03.
- 4) ☐ Interview Summary (PTO-413)  
Paper No(s)/Mail Date. \_\_\_\_\_.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: \_\_\_\_\_.

### DETAILED ACTION

1. This office action is in response to application filed on 10/24/2003. *Claims 1-20* are now pending in the application.

2. If applicant desires benefit of a previously filed application under 35 U.S.C. 121, specific reference to the earlier filed application must be made in the instant application. For benefit claims under 35 U.S.C. 120, 121 or 365(c), the reference must include the relationship (i.e., continuation, divisional, or continuation-in-part) of the applications. This should appear as the first sentence(s) of the specification following the title, preferably as a separate paragraph unless it appears in an application data sheet. The status of nonprovisional parent application(s) (whether patented or abandoned) should also be included. If a parent application has become a patent, the expression "now Patent No. \_\_\_\_" should follow the filing date of the parent application. If a parent application has become abandoned, the expression "now abandoned" should follow the filing date of the parent application.

If the application is a utility or plant application filed under 35 U.S.C. 111(a) on or after November 29, 2000, the specific reference must be submitted during the pendency of the application and within the later of four months from the actual filing date of the application or sixteen months from the filing date of the prior application. If the application is a utility or plant application which entered the national stage from an international application filed on or after November 29, 2000, after compliance with 35 U.S.C. 371, the specific reference must be submitted during the pendency of the application and within the later of four months from the

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date on which the national stage commenced under 35 U.S.C. 371(b) or (f) or sixteen months from the filing date of the prior application. See 37 CFR 1.78(a)(2)(ii) and (a)(5)(ii). This time period is not extendable and a failure to submit the reference required by 35 U.S.C. 119(e) and/or 120, where applicable, within this time period is considered a waiver of any benefit of such prior application(s) under 35 U.S.C. 119(e), 120, 121 and 365(c). A benefit claim filed after the required time period may be accepted if it is accompanied by a grantable petition to accept an unintentionally delayed benefit claim under 35 U.S.C. 119(e), 120, 121 and 365(c). The petition must be accompanied by (1) the reference required by 35 U.S.C. 120 or 119(e) and 37 CFR 1.78(a)(2) or (a)(5) to the prior application (unless previously submitted), (2) a surcharge under 37 CFR 1.17(t), and (3) a statement that the entire delay between the date the claim was due under 37 CFR 1.78(a)(2) or (a)(5) and the date the claim was filed was unintentional. The Director may require additional information where there is a question whether the delay was unintentional. The petition should be addressed to: Mail Stop Petition, Commissioner for Patents, P.O. Box 1450, Alexandria, Virginia 22313-1450.

### ***Election/Restrictions***

3. Restriction to one of the following inventions is required under 35 U.S.C. 121:

- I. ***Claims 1-8***, drawn to an adhesive composition, classified in class 524, subclass 555.

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II. *Claims 9-20*, drawn to a process of applying coating composition, classified in class 427, subclass 207.1.

4. Inventions I and II are related as product and process of use. The inventions can be shown to be distinct if either or both of the following can be shown: (1) the process for using the product as claimed can be practiced with another materially different product or (2) the product as claimed can be used in a materially different process of using that product (MPEP § 806.05(h)). In the instant case, the adhesive compositions may be useful in processes for bonding cellulosic substrates.

5. Because these inventions are distinct for the reasons given above and have acquired a separate status in the art as shown by their different classification, restriction for examination purposes as indicated is proper.

6. Because these inventions are distinct for the reasons given above and have acquired a separate status in the art because of their recognized divergent subject matter, restriction for examination purposes as indicated is proper.

7. During a telephone conversation with Mr. Robert Mulcahy on March 4, 2005, a provisional election was made *without* traverse to prosecute the invention of I, *claims 1-8*. Affirmation of this election must be made by applicant in replying to this Office action. *Claims*

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9-20 are withdrawn from further consideration by the examiner, 37 CFR 1.142(b), as being drawn to a non-elected invention.

### *Claim Objections*

8. *Claims 1 and 2* are objected to for the following reasons:

The scope of *claim 1* is unclear as recited in that the phrase “a high evaporation solvent comprised of high evaporation rate organic co-solvent...” is vague and ambiguous. The claim language may be revised to include a “high evaporation rate solvent-co-solvent mixture...”

*Claim 2* has mixtures thereof repeated twice.

Appropriate corrections are requested.

### *Claim Rejections - 35 USC § 102 and 103*

9. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

10. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill

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in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

11. *Claims 1-3, 7, 8* are rejected under 35 U.S.C. 102(b) as anticipated by Araki et al. (US 3,264,249).

Prior art to Araki et al. discloses adhesive compositions comprising an  $\alpha$ -cyanoacrylate (column 2, lines 23-32, a diene type copolymer such as butadiene-styrene copolymers (column 2, lines 5-9) and solvents (column 2, lines 63-69). The disclosure further teaches a variety of solvents such as acetone, MEK, hydrocarbon chlorides, methyl acetate, butyl acetate etc. which may be used alone or as a mixture of two or more. The ratio of  $\alpha$ -cyanoacrylate to the diene type copolymer may be 1:0.7-1.8 by weight (column 1, lines 53-60). It is the examiners position that "the adhesive composition for thermoplastic substrate" in the preamble includes an intended use that is not accorded any patentable weight. It is also the examiner's position that the solvents disclosed in the prior art are inherently inert organic solvents and therefore, capable of dissolving but not reacting with the styrenic copolymers and thermoplastic substrates.

12. *Claims 4 and 5* are rejected under 35 U.S.C. 103(a) as being unpatentable over Araki et al. (US 3,264,249).

Prior art to Araki et al. is elaborated above in paragraph 8 and is incorporated herein by reference.

The prior teaches teaches an adhesive composition comprising a high evaporation solvent selected from the group consisting of t-butyl acetate, cyclohexanone, heptane, toluene, xylene and mixtures thereof.

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The prior art to Araki et al. recognizes ketones and acetic esters as useful solvents with only a few species of the genus exemplified. However, given the generic teaching of useful organic solvents, it would have been obvious to one of ordinary skill in the art at the time the invention was made to include common organic solvents including the ones claimed instantly in the adhesive compositions and thereby obtain the present invention.

13. *Claims 1, 2, 7, 8* are rejected under 35 U.S.C. 102(b) as anticipated by Hiraiwa et al. (US 4,980,086).

Hiraiwa et al. disclose a curable composition comprising 2-cyanoacrylates for use as adhesives, coatings etc. (abstract). A variety of 2-cyanoacrylates are disclosed in column 2, lines 55-69. The compositions may include styrene/butadiene rubber, acryl rubber/acrylonitrile/styrene copolymer, EPDM rubber/acrylonitrile/styrene copolymer etc. (column 4, lines 8-20). The impact modifying rubber may be included in amounts of 0.01 to 20 parts by wt. per 100 parts of 2-cyanoacrylate (column 4, lines 34-40). The prior art further discloses a variety of solvents such as acetone, MEK, chloroform etc. The solvents may be used alone or as a mixed solvent (column 5, lines 54-66). It is the examiner's position that the solvents disclosed in the prior art are inherently inert organic solvents and therefore, capable of dissolving but not reacting with the styrenic copolymers and thermoplastic substrates.

14. *Claims 4 and 5* are rejected under 35 U.S.C. 103(a) as being unpatentable over Hiraiwa et al. (US 4,980,086).



Prior art to Hiraiwa et al. is elaborated above in paragraph 10 and is incorporated herein by reference.

The prior teaches an adhesive composition comprising a high evaporation solvent selected from the group consisting of t-butyl acetate, cyclohexanone, heptane, toluene, xylene and mixtures thereof.

The prior art to Hiraiwa et al. recognizes ketones with less than 9 carbon atoms and esters of acids with less than 3 carbon atoms and alcohols with less than 7 carbon atoms as useful solvents with only a few species of the genus exemplified. However, given the generic teaching of useful organic solvents, it would have been obvious to one of ordinary skill in the art at the time the invention was made to include common organic solvents including the ones claimed instantly in the adhesive compositions and thereby obtain the present invention.

#### *Allowable Subject Matter*

15. *Claim 6* is objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

The following is a statement of reasons for the indication of allowable subject matter: Instant claim is directed to an adhesive composition comprising from about 2 to 10 weight% of the  $\alpha$ -cyanoacrylate based on the weight of the styrenic copolymer.

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*Conclusion*

16. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Satya Sastri at (571) 212 1112.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, David Wu can be reached at (571) 212 1114.

The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).



SATYA SASTRI

March 3, 2005

**TATYANA ZOLUKAEVA**  
**PRIMARY EXAMINER**

